

## TAXONOMIC CHANGES IN ORIENTAL FULGOROIDEA (HEMIPTERA: FULGOROMORPHA)

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*Abstract.*—*Guentheria formosa* Lallemand is transferred from the Phenacinae of the Fulgoridae to the Eurybrachidae. *Hellerides* Lallemand of the Limoisini of the Aphaeninae of the Fulgoridae is synonymised with *Zophiuma* Fennah of the Lophopidae. Two new specific combinations *Z. guineae* (Lallemand) and *Z. butawengi* (Heller) are established.

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Examination of several fulgoroid genera revealed that *Guentheria* Lallemand, previously described in the Phenacinae of the Fulgoridae, is a member of the Eurybrachidae and *Hellerides* Lallemand, previously described in the Limoisini of the Aphaeninae of the Fulgoridae, is a new synonymy of *Zophiuma* Fennah of the Lophopidae. The purpose of the present paper is to report these taxonomic changes.

### EURYBRACHIDAE

#### *Guentheria* Lallemand, **New Placement**

*Guentheria* Lallemand, 1963: 6. Type species: *Guentheria formosa* Lallemand, 1963: 6, by original designation and monotypy. Referred from Fulgoridae: Phenacinae.

**Discussion:** *Guentheria* was established by Lallemand (1963) in the Phenacinae of the Fulgoridae to contain a single species *G. formosa* from southern China. Since then, neither the genus nor species has been mentioned in the literature. My examination of three new specimens clearly identifiable as *G. formosa* indicates that *Guentheria* is actually a member of the Eurybrachidae. I am here transferring *Guentheria formosa* Lallemand from the Phenacinae of the Fulgoridae to the Eurybrachidae on the basis of the following characters: (1) eyes spinose beneath; (2) frons broad, broader than long, without median carina, the lateral margins angulate near middle; (3) clypeus without lateral carinae; (4) rostrum flat and short, not extending beyond the hind trochanters, apex bisulcate; (5) antennal pedicel relatively small and with few sensory organs; (6) pronotum short; (7) anterior coxae short, anterior trochanters near the postclypeus; (8) anterior and middle femora and tibiae compressed, more or less dilated; (9) the second hind tarsomere small, without apical spines; and (10) the females have large leaf-like wax plates.

At present, only female specimens of *G. formosa* are available. It is necessary to study the structures of the male genitalia to establish the correct status of the *Guentheria* within the Eurybrachidae.

*Guentheria formosa* Lallemand

*Guentheria formosa* Lallemand, 1963: 6.

**Discussion:** Lallemand (1963) originally described *Guentheria formosa* from a single female taken at Canton, Guangdong Province in southern China. I have found three females of this species from Fujian Province in southeastern China.

**Distribution:** China (Guangdong and Fujian Provinces).

**Specimens Examined:** CHINA, FUJIAN PROVINCE: 1 ♀, Jiangle, Mt. Longxishan, 18.x.1991 (C. M. Huang); 1 ♀, same locality, but 840 m, 22.vi.1991 (L. L. Yang); 1 ♀, same locality, but 850 m, 24.vi.1991 (W. C. Ma) (all in the Insect Collection of the Institute of Zoology of the Chinese Academy of Sciences, Beijing, China).

## LOPHOPIDAE

*Zophiuma* Fennah

*Zophiuma* Fennah, 1955: 170. Type species: *Acarna pupillata* Stål, 1863, by original designation.

*Hellerides* Lallemand, 1962: 1; 1963: 56. Type species: *Hellerides guineae* Lallemand, 1962, by original designation and monotypy. **New Synonymy.**

**Discussion:** *Zophiuma* was established by Fennah (1955) for *Acarna pupillata* Stål (1863: 586) (type species) and *Kasserota doreyensis* Distant (1906: 350) in the Lophopidae. Ghauri (1967: 557) added the third species *Z. lobulata*.

Lallemand (1962) proposed the new genus *Hellerides* to contain *H. guineae* in the Limoisini of the Aphaeninae of the Fulgoridae. Heller (1966) added the second species *H. butawengi*. A careful reading of both Lallemand's (1962) and Heller's (1966) original descriptions and illustrations shows that both *H. guineae* Lallemand and *H. butawengi* Heller are typical members of *Zophiuma* and that *Hellerides* Lallemand is a new synonym of *Zophiuma* Fennah.

The two species transferred from the *Hellerides* increases the total number of the species of *Zophiuma* to five. They are all described from New Guinea. Further studies may show some new specific synonymies.

*Zophiuma guineae* (Lallemand), **New Combination**

*Hellerides guineae* Lallemand, 1962: 3, figs. 1–6; 1963: 56.

**Discussion:** This species was described from a single female collected from New Guinea. Lallemand (1962) gave detailed original description and adequate illustrations. The original description and illustrations clearly show that *guineae* belongs in *Zophiuma*.

**Distribution:** New Guinea.

*Zophiuma butawengi* (Heller), **New Combination**

*Hellerides butawengi* Heller, 1966: 1, figs. 1–6.

**Discussion:** This species was adequately described and illustrated by Heller (1966) from a single female taken in New Guinea. The original description and illustrations clearly show that it belongs in *Zophiuma*.

**Distribution:** New Guinea.

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